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HALLIVUORI(10) **Pub. No.: US 2016/0173140 A1**(43) **Pub. Date: Jun. 16, 2016**(54) **METHOD AND APPARATUS FOR AN**
ANTENNA(52) **U.S. Cl.**
CPC **H04B 1/0458** (2013.01)(71) Applicant: **Nokia Corporation**, Espoo (FI)(72) Inventor: **Juha HALLIVUORI**, Tampere (FI)(73) Assignee: **Nokia Technologies Oy**, Espoo (FI)(21) Appl. No.: **14/900,953**(22) PCT Filed: **Jun. 28, 2013**(86) PCT No.: **PCT/FI2013/050720**

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H04B 1/04 (2006.01)(57) **ABSTRACT**

There are disclosed various methods and apparatuses for an antenna. In some embodiments of the method a transmission signal is provided to a first feed point (126) of an antenna (102). A modified signal is generated from the transmission signal and provided to a second feed point (128) of the antenna (102). In some embodiments the apparatus comprises an antenna comprising a first feed point (126) and a second feed point (128). There is also a first interface to provide a transmission signal to the first feed point (126), and a phase shifter (124) for generating a modified signal from the transmission signal. The modified signal is provided to a second feed point (128) of the antenna (102).

